

What is claimed is:

1. An optical pickup apparatus for reading information from a plurality of types of discs at different reading wavelengths, comprising:

a light source having a plurality of integrated light emitting portions for emitting laser beams of different wavelengths, said light source being adapted to selectively emit one of the laser beams of different wavelengths;

a photodetector for detecting the laser beam; and
an optical system for directing the laser beam emitted from said light source to said disc, and for directing the laser beam reflected by said disc to said photodetector,

wherein said light source is positioned such that a straight line connecting respective light emitting points of said plurality of light emitting portions is coincident with a tangential line of a track on a disc to be reproduced.

2. An optical pickup apparatus according to claim 1, wherein:

said optical system includes an astigmatism element for providing the laser beam with astigmatism, and said photodetector includes a plurality of four-division light receiving sections arranged corresponding to each of the plurality of laser beams of different wavelengths, and is configured such that central division lines of said four-division light receiving sections are in alignment with one another; and

said photodetector is disposed such that said central division lines are coincident with said tangential line of the track.

- 5 3. An optical pickup apparatus according to claim 1,
wherein:

said optical system includes an astigmatism element for providing the laser beam with astigmatism, and a diffraction element for generating a pair of subbeams from the laser beam;

10 said photodetector includes a plurality of four-division light receiving sections arranged in correspondence to each of the plurality of laser beams of different wavelengths, said plurality of four-division light receiving sections being arranged such that central division lines thereof are in alignment with one another;

15 said photodetector further includes a pair of subbeam receiving sections, disposed one after the other in a direction in which said central division lines extend, for receiving said subbeams; and

20 said plurality of four-division light receiving sections are arranged such that one of said subbeams is received by a different four-division light receiving section adjacent to a four-division light receiving section which receives the selected laser beam.

- 25 4. An optical pickup apparatus according to claim 1,
wherein:

said optical system includes an astigmatism element for providing the laser beam with astigmatism, and a diffraction element

for generating a pair of subbeams from said laser beam;

said photodetector includes a plurality of four-division light receiving sections arranged in correspondence to each of the plurality of laser beams of different wavelengths, said plurality of four-division light receiving sections arranged such that central division lines thereof are in alignment with one another;

said photodetector further includes a pair of subbeam receiving sections, disposed one after the other in a direction in which said central division lines extend, for receiving said subbeams; and

said subbeam receiving sections are formed with regions which can receive all subbeams generated from all the laser beams of different wavelengths emitted from said light source.

5. An optical pickup apparatus according to claim 1, wherein:

said optical system includes an astigmatism element for providing said laser beam with astigmatism, and a diffraction element for generating a pair of subbeams from the laser beam;

said photodetector includes a plurality of four-division light receiving sections arranged in correspondence to each of the plurality of laser beams of different wavelengths, said plurality of four-division light receiving sections arranged such that central division lines thereof are in alignment with one another; wherein two divisional regions of the four-division light receiving section for receiving an arbitrary laser beam serve as two divisional regions of a four-division light receiving section for

receiving a laser beam of a different wavelength from that of said arbitrary laser beam; and the remaining two divisional regions other than said two divisional regions are also used as a subbeam receiving section for receiving said subbeam.

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6. An optical pickup apparatus according to claim 1, wherein said light source is a one-chip laser diode which is formed with one electrode as a common electrode for said plurality of light emitting portions.



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